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EXAMINER

JUNG, ALLEN J

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UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

Ex parte RICHARD D. DETTINGER and RICHARD J. STEVENS

Appeal 2016-003115
Application 13/758,427
Technology Center 3600

Before ALLEN R. MacDONALD, NABEEL U. KHAN, and
SHARON FENICK, *Administrative Patent Judges*.

MacDONALD, *Administrative Patent Judge*.

DECISION ON APPEAL¹

¹ In parallel with this Decision, this Panel decides related Appeal 2016-003116 (U.S. Patent Application Serial Number 13/758,492). *See* App. Br. 4.

STATEMENT OF THE CASE

Appellants appeal under 35 U.S.C. § 134(a) from a Final Rejection of claims 1–10. We have jurisdiction under 35 U.S.C. § 6(b). We AFFIRM.

Representative Claim

Representative claim 1 under appeal read as follows (emphasis and brackets added):

1. A computer program product, comprising:

a non-transitory computer-readable storage medium having computer-readable program code embodied therewith, the computer-readable program code comprising:

[a)] computer-readable program code configured *to map, in a data abstraction model, a plurality of logical fields to a plurality of physical entities of physical data having a particular physical representation in a database*, wherein each logical field specifies a respective access method selected from at least two different types of access methods;

[b)] computer-readable program code configured to receive a selection of an abstract modification operation;

[c)] computer-readable program code configured to receive a selection of a model entity definition on which to perform the abstract modification operation, the model entity definition specified in the data abstraction model, the model entity definition comprising two or more of the plurality of logical fields, each corresponding to a separate physical entity;

[d)] computer-readable program code configured to, based on at least the received selections, generate at least two physical modification statements, each modifying one of the two separate physical entities of the physical data;

[e)] computer-readable program code configured to order the at least two physical modification statements;

[f)] computer-readable program code configured to execute modification operations according to the physical modification statements, whereby the data is modified; and

[g)] computer-readable program code configured to ***calculate a fee to charge for executing the modification operations*** based on a defined fee schedule for the model entity definition.

References

Kubica et al.	US 2002/0035432 A1	March 21, 2002
Rubio et al.	US 2002/0062241 A1	May 23, 2002

Rejections

1. The Examiner rejected claims 1–10 under 35 U.S.C. § 101 “because the claimed invention is directed to a judicial exception (i.e., a law of nature, a natural phenomenon, or an abstract idea) without significantly more” (Final Act. 7), i.e., the claimed invention is directed to non-statutory subject matter.²
2. The Examiner rejected claims 1–10 under 35 U.S.C. § 103(a) as being unpatentable over the combination of Kubica and Rubio.³

Issues on Appeal

Did the Examiner err in rejecting claim 1 as being directed to non-statutory subject matter?

Did the Examiner err in rejecting claim 1 as being obvious?

² We select claim 1 as representative. Separate patentability is not argued for claims 2–10. Except for our ultimate decision, the § 101 rejection of claims 2–10 is not discussed further herein.

³ We select claim 1 as representative. Separate patentability is not argued for claims 2–10. Thus, the rejection of these claims turns on our decision as to claim 1. Except for our ultimate decision, the § 103 rejection of claims 2–10 is not discussed further herein.

ANALYSIS

We have reviewed the Examiner's rejections in light of Appellants' arguments (Appeal Brief and Reply Brief) that the Examiner has erred.

1. Non-Statutory Subject Matter

A

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because:

Applicants respectfully submit that the present claims satisfy the streamlined patent-eligibility analysis under section 1(B)(3) of the *2014 Interim Guidance on Patent Subject Matter Eligibility* guidelines, which explains that “a streamlined eligibility analysis can be used for a claim that may or may not recite a judicial exception but, when viewed as a whole, clearly does not seek to tie up any judicial exception such that others cannot practice it.”

App. Br. 16.

For the purpose of the streamlined analysis of Section 1(B)(3), applicants submit that the present claims are not an attempt to “tie up” any abstract idea. Again, ***section 1(B)(3) requires*** that the claim, “when viewed as a whole does not seek to tie up any judicial exception such that others cannot practice it.”

App. Br. 17 (emphasis added).

In addition, ***the streamlined analysis of section 1(B)(3) should apply*** because the claims recite meaningful limitations, such as “mapping, in a data abstraction model, a plurality of logical fields to a plurality of physical entities of physical data having a particular physical representation in a database, wherein each logical field specifies a respective access method selected from at least two different types of access methods.” The Examiner has ignored a litany of meaningful claim limitations which not only fail to “tie up” an abstract idea, but do not recite an abstract idea when viewed as a whole. Accordingly, Applicants respectfully submit that the present claims satisfy the

streamlined patent-eligibility analysis under section 1(B)(3) of the *2014 Interim Guidance on Patent Subject Matter Eligibility* guidelines.

App. Br. 18 (emphasis added).

Appellants mischaracterize the purpose of section 1(B)(3) of the *2014 Interim Guidance on Patent Subject Matter Eligibility* guidelines as placing a requirement on the Examiner (“section 1(B)(3) requires” (App. Br. 17)). Rather, section 1(B)(3) is available to the Examiner as a discretionary streamlined § 101 *Alice/Mayo* analysis favoring Applicant. Section 1(B)(3) is explicit that “if there is doubt as to whether the applicant is effectively seeking coverage for a judicial exception itself, ***the full analysis should be conducted.***” Emphasis added. Contrary to Appellants’ argument, the streamlined patent-eligibility analysis under section 1(B)(3) is not required to be available to Appellants; rather, it is at the Examiner’s discretion. The Examiner choosing to perform a full § 101 *Alice/Mayo* analysis is not an error.

Further, any Examiner’s failure to follow the Director’s guidance is appealable only to the extent that the Examiner has failed to follow the statutes or case law. That is, to the extent the Director’s guidance goes beyond the case law and is more restrictive on the Examiner than the case law, failure of the Examiner to follow those added restrictions is a matter for petition to the Director. We review Appellants’ particular arguments against the case law and find no requirement in the law that the Examiner perform a section 1(B)(3) streamlined § 101 *Alice/Mayo* analysis.

B

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because:

The Examiner has not identified a specific “abstract idea.” Instead, the Examiner makes a blanket assertion that the claims are directed to “fundamental economic practices and/or certain methods of organizing human activities.” *Applicants are left to speculate* as to what the “fundamental economic practices” and/or “methods of organizing human activities are.” A “fundamental economic practice” is far broader than what is recited by the specific independent claim limitations. Instead, a “fundamental economic practice” is one that rises to the level of the intermediated settlement in *Alice Corp. v. CLS Bank Int’l*, or the risk hedging in *Bilski v. Kappos*, 130 S.Ct. 3218, 3227 (2010). A reading of the instant claims, as a whole, reveals neither a “fundamental economic practice” nor a “method of organizing human activities.”

App. Br. 18 (emphasis added).

At page 7 of the Final Action, the Examiner finds:

Claims 1-10 are directed to selection of a modification operation, generating modification statements, executing modification operation by modifying data, and calculating a fee to charge for executing the modification operations, which constitute abstract idea(s) of fundamental economic practices and/or certain methods of organizing human activities.

Our reviewing court, regarding the notice requirement as set forth by 35 U.S.C. § 132, explains:

[T]he PTO carries its procedural burden of establishing a prima facie case when its rejection satisfies 35 U.S.C. § 132, in “notify[ing] the applicant ... [by] stating the reasons for [its] rejection, or objection or requirement, together with such information and references as may be useful in judging of the propriety of continuing the prosecution of [the] application.” 35 U.S.C. § 132. That section “is violated when a rejection is so uninformative that it prevents the applicant from recognizing and

seeking to counter the grounds for rejection.” *Chester v. Miller*, 906 F.2d 1574, 1578 (Fed.Cir.1990).

In re Jung, 637 F.3d 1356, 1362 (Fed. Cir. 2011).

Appellants are arguing the Examiner’s notice is so uninformative that it prevents the applicant from recognizing and seeking to counter the grounds for rejection. We disagree. Contrary to Appellants’ argument, no inappropriate speculation is required as to what the fundamental economic practices and/or methods of organizing human activities are in claim 1.

C

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because:

[T]he Examiner failed to show that the claims, as a whole, are directed to an abstract idea. Instead, the Examiner summarily concludes, without analysis, that the claims are directed an abstract idea and/or certain methods of organizing human activities. *Final Office Action*, pp. 7-8. As such, Applicants are left to speculate as to which abstract ideas the Examiner believes the claims are directed to as a whole.

App. Br. 19.

We disagree. Appellants are mistaken in arguing the Examiner must show in step 1 of *Alice* “the claims, as a whole, are directed to an abstract idea.” App. Br. 19. Appellants overlook that in the two-step *Alice* analysis, determining whether a method or process recites an abstract idea is in step 1 of *Alice*, and analyzing the claim as a whole is in step 2. *See Alice Corp. v. CLS Bank Int’l*, 134 S. Ct. 2347, 2355, n.3 (2014). Appellants have conflated the two steps. There is no requirement in *Alice* step 1 that as to the abstract idea the claim be considered as a whole.

D

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because:

Applicants respectfully submit that the claims are not directed to “certain methods of organizing human activities.” The claims do not make any reference to a user, a human, or any human activities. Therefore, a reading of the claims forecloses any possibility that the claims are directed towards “certain methods of organizing human activities.” Applicants respectfully submit that the Examiner erred in concluding that the claims are directed towards “certain methods of organizing human activities.”

The Examiner argues the claim limitations “can be construed as an organization of human activities, because these are operations that can be carried out manually.” *Final Office Action*, pp. 5-6. The Examiner asserts that the instant claims are “analogous to *Planet Bingo v. VKGS*, in which the court found that, aside from generic computer implementations of the activities, the activities are the ones that are possible to be carried out manually.” *Id.* The *Planet Bingo* court held that managing the game of bingo consists solely of mental steps which can be carried out by a human using pen and paper. *2014 Interim Guidance on Patent Subject Matter Eligibility*, p. 74631. However, the game of bingo is not analogous to databases, let alone the abstract databases recited in the claims. To carry out the steps of the claims manually would require, for example, “mapping, in a data abstraction model, a plurality of logical fields to a plurality of physical entities of physical data having a particular physical representation in a database, wherein each logical field specifies a respective access method selected from at least two different types of access methods.” ***Such a manual or mental process is impossible, as one cannot “access” mental or handwritten information in more than one way.*** Therefore, the claims are not directed to methods of organizing human activity.

App. Br. 19–20 (emphasis added).

Applicants respectfully submit that abstract databases are not a “question of ancient lineage,” considering computers themselves were invented in the last century.

App. Br. 20.

We disagree. Appellants are simply mistaken in arguing it is not long known to access handwritten information (i.e., paper based data) in more than one way. Many long established alternative access methods are well-known, e.g., the “Dewey Decimal Classification” and “Library of Congress Classification” systems. The Examiner did not err in concluding the claims encompass certain methods of organizing human activities.

E

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because:

While the independent claims recite “calculating ... a fee to charge for executing the modification operations” ***this limitation does not rise to the level of a fundamental economic practice***, such as the intermediated settlement in *Alice Corp. v. CLS Bank Int’l*, or the risk hedging in *Bilski v. Kappos*, 130 S.Ct. 3218, 3227 (2010). Indeed, calculation of the fee is “based on a defined fee schedule for the model entity definition,” as recited by the claims.

App. Br. 20.

We disagree. Contrary to Appellants’ position, we conclude that calculating a fee is a fundamental economic principle. We agree with the Examiner that fee calculation “is an activity that pertains to ‘agreements between people in the form of contracts, legal obligations, and business relations.’” Ans. 14; *see also* Final Act. 5–6.

F

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 101 because “the claims satisfy the second part of the *Mayo* test by claiming inventive steps that clearly amount to significantly more than a patent upon an abstract idea.” App. Br. 21.

[Claim 1 supplies] at least the inventive steps of:

- receiving a selection of a model entity definition on which to perform the abstract modification operation, the model entity definition specified in a data abstraction model, the model entity definition comprising two or more logical fields each corresponding to a separate physical entity
- based on at least the received selections, generating at least two physical modification statements, each modifying one of the two separate physical entities of the physical data, and
- calculating a fee to charge for executing the modification operations based on a defined fee schedule for the model entity definition

If the claims were directed to a mere computer implementation of what the Examiner argues is a “fundamental economic principle,” the claims would only include a single limitation directed to calculating a fee for executing a modification statement. However, as evidenced by the detailed, specific limitations of the claims, the claims supply the necessary inventive concepts, including the computation of a fee in a meaningful way (“based on a defined fee schedule for the model entity definition”). When viewed in combination, the limitations of claim[1] provide significantly more than the judicial exception.

App. Br. 21–22.

Much like the claims at issue in *DDR Holdings*, [the] presently claimed solution is “rooted in computer technology” and solves a technical problem of composing and executing abstract queries. The present claims do not recite the performance of a known business practice outside of computer

technology and require that it simply be performed by computers. Rather, the solution provided by the claimed invention addresses a challenge particular to abstract databases.

App. Br. 22.

First, Appellants' argument overlooks the Examiner's reasoning that claim 1 is directed to both "abstract idea(s) of fundamental economic practices and/or certain methods of organizing human activities."

Second, Appellants list elements of claim 1 without any persuasive explanation of how the elements either individually, or as an ordered combination, amount to an inventive concept that converts an abstract idea into patent-eligible subject matter. Appellants assert that like DDR, the claim solution is rooted in computer technology and solves a technical problem of composing and executing abstract queries, but do not explain why. App Br. 22. Without more we are not persuaded the Examiner's reasoning is mistaken.

2. Obviousness

Appellants contend that the Examiner erred in rejecting claim 1 under 35 U.S.C. § 103(a) because:

The Examiner argues that *Kubica* teaches a "data abstraction model" and "mapping, in a data abstraction model, a plurality of logical fields to a plurality of physical entities of physical data having a particular physical representation in a database, wherein each logical field specifies a respective access method selected from at least two different types of access methods" at paragraphs [0026] and [0108]-[0109]. *Final Office Action*, p. 9.

App. Br. 9.

[T]he Examiner suggests that a relational database is a data abstraction model that contains a plurality of logical fields

mapping to a plurality of physical entities of physical data in a database. Respectfully, *the Examiner's position is simply untenable*; first, Applicant's own specification preclude the Examiner's interpretation of a relational database and a data abstraction model and, second, *Kubica* is simply devoid of the specific limitations recited in the Applicant's claims.

App. Br. 9 (emphasis added).

Nothing in the relational database of *Kubica* discloses this [data abstraction model] kind of structure. To the contrary, the relational database of *Kubica* is precisely the kind of physical data on which the claimed data abstraction model could be built.

App. Br. 11.

We conclude, consistent with Appellants' argument, there is insufficient articulated reasoning to support the Examiner's findings that *Kubica* discloses "data abstraction model" and "code configured to map, in a data abstraction model, a plurality of logical fields to a plurality of physical entities of physical data having a particular physical representation in a database." Therefore, we conclude that there is insufficient articulated reasoning to support the Examiner's final conclusion that claim 1 would have been obvious to one of ordinary skill in the art at the time of Appellants' invention.

CONCLUSIONS

- (1) The Examiner has not erred in rejecting claims 1–10 under 35 U.S.C. § 101, as being directed to non-statutory subject matter.
- (2) Appellants have established that the Examiner erred in rejecting claims 1–10 as being unpatentable under 35 U.S.C. § 103(a).
- (3) Claims 1–10 are not patentable.

DECISION

The Examiner's rejection of claims 1–10 under 35 U.S.C. § 101, as being directed to non-statutory subject matter, is **affirmed**.

The Examiner's rejections of claims 1–10 as being unpatentable under 35 U.S.C. § 103(a) are **reversed**.

No time period for taking any subsequent action in connection with this appeal may be extended under 37 C.F.R. § 1.136(a)(1)(iv).

AFFIRMED